Figure 1:

AS 01: 3'-teg-G*G*G C*C*C*G G*C A*C*C G*T*C*C T*T*C*G
AS 02: 3'-teg-G*G*G*T*C A A G*C*C*C T*C*T G*T A*C*C*G
AS 03: 3'-teg-G*C*C*C T*C*T G*T A*C*C G*C*C*C G*C*A*A
AS 04: 3'-teg-T*A*C*C G*C*C*C G*C A A*T*T*T*C G A*G*A
AS 05: 3'-teg-T*T*C*G A G A*G*C A*C*C G*T A A*T A*G*G
AS 06: 3'-teg-G*A*A*T A*C G A*C*C*C*T A*C A*C G G*A*A
AS 07: 3'-teg-A*C*A*C G G A A*T*C*T C*C*T*A A*T A*C*C
AS 08: 3'-teg-C*T*C*C*T A A*T A*C*C G*C A A*A*T G*A*C
AS 09: 3'-teg-C*C*G*C*A A A*T G A*C*C*G G G A*A T*A*A
AS 10: 3'-teg-A*C*G G A*C A G*C*C*C T*T*G A*C*C G*T*A
AS 11: 3'-teg-G*G*A*C A G*C*C*C T*T*G A*C*C G*T A*T A*A*A
AS 12: 3'-teg-G*C*C*C T*T*G A*C*C G*T A*T A A*A G*A*A
AS 13: 3'-teg-G*G*A A*C*A*C A A*C*C*G T*C*C*G T*T*A*C
AS 14: 3'-teg-T*G*T A*C A*C G*T G*T A*C G*C*C G*T A*A
AS 15: 3'-teg-G*C*C*T C*C*T G*T C*C*A G*C*C*G C*C*A*A
AS 16: 3'-teg-G*G*A*C*C G A*C*A T*T*G C*A*C G*T C*T A*A*A

*: Thioéster
_: 2'O-Méthylation
teg: espaceur Triéthylenglycol

Figure 2

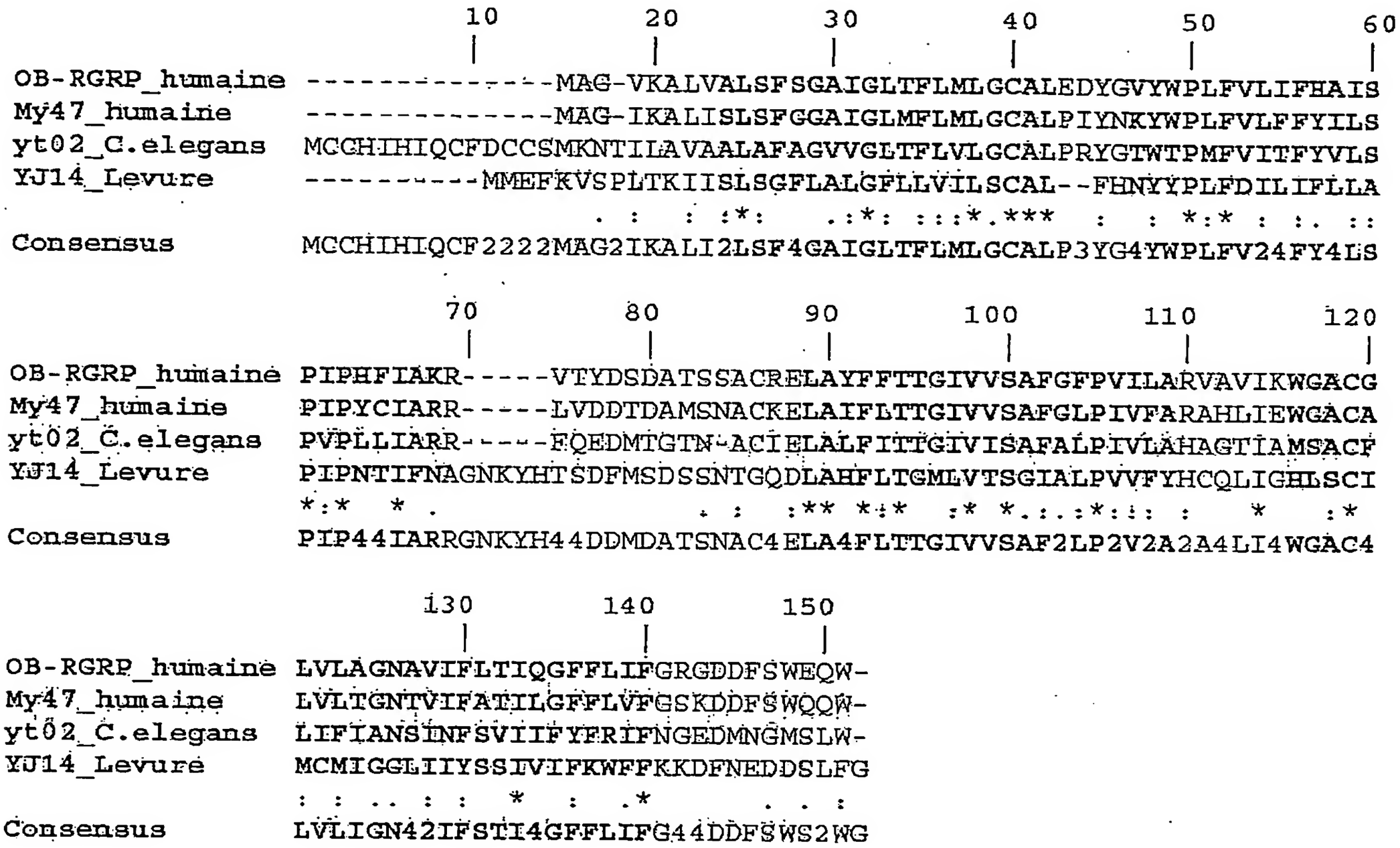

10 20 30 40 50 60
OB-RGRP_humaine ----------MAG-VKALVALSFSGAIGLTFLMLGCALEDYGVYWPLFVLIFHAIS
My47_humaine ----------MAG-IKALISLSFGGAIGLMFLMLGCALPIYNKYWPLFVLFFYILS
yt02_C.elegans MCCHIHIQCFDCCSMKNTILAVAALAFAGVVGLTFLVLGCALPRYGTWTPMFVITFYVLS
YJ14_Levure ----------MMEFKVSPLTKIISLSGFLALGFLLVILSCAL--FHNYYPLFDILIFLLA
Consensus MCCHIHIQCF2222MAG2IKALI2LSF4GAIGLTFLMLGCALP3YG4YWPLFV24FY4LS
70 80 90 100 110 120
OB-RGRP_humaine PIPHFIAKR-----VTYDSDATSSACRELAYFFTTGIVVSAFGFPVILARVAVIKWGACG
My47_humaine PIPYCIARR-----LVDDTDAMSNACKELAIFLTTGIVVSAFGLPIVFARAHLIEWGACA
yt02_C.elegans PVPLLIARR-----FQEDMTGTN-ACIELALFITTGIVISAFALPIVLAHAGTIAMSACF
YJ14_Levure PIPNTIFNAGNKYHTSDFMSDSSNTGQDLAHFLTGMLVTSGIALPVVFYHCQLIGHLSCI
Consensus PIP44IARRGNKYH44DDMDATSNAC4ELA4FLTTGIVVSAF2LP2V2A2A4LI4WGAC4
130 140 150
OB-RGRP_humaine LVLAGNAVIFLTIQGFFLIFGRGDDFSWEQW-
My47_humaine LVLTGNTVIFATILGFFLVFGSKDDFSWQQW-
yt02_C.elegans LIFIANSINFSVIIFYFRIFNGEDMNGMSLW-
YJ14_Levure MCMIGGLIIYSSIVIFKWFFKKDFNEDDSLFG
Consensus LVLIGN42IFSTI4GFFLIFG44DDFSWS2WG

Figure3A

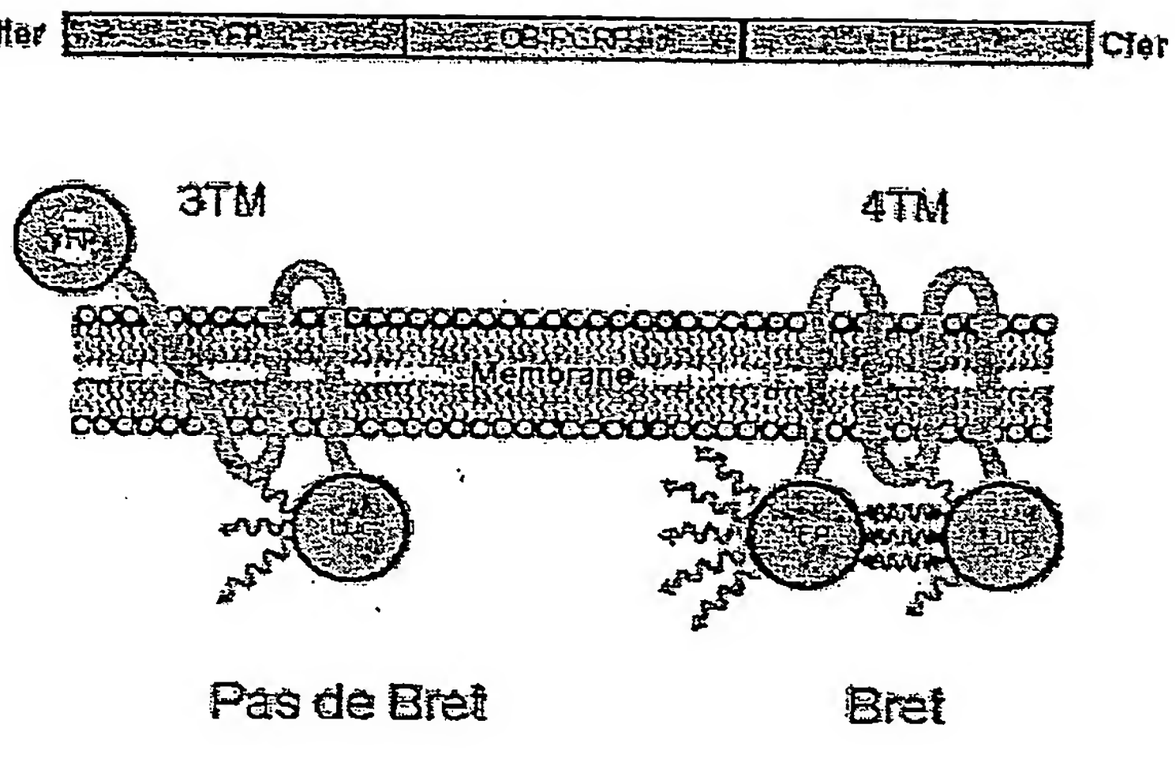


Figure3B

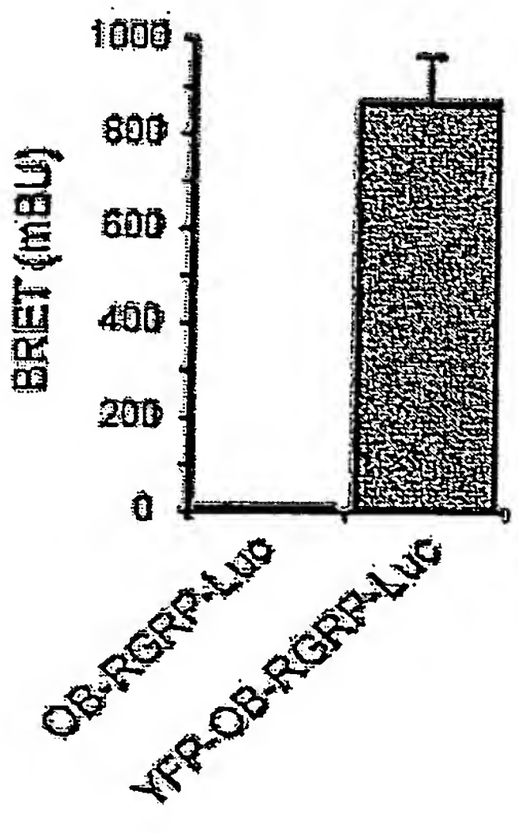
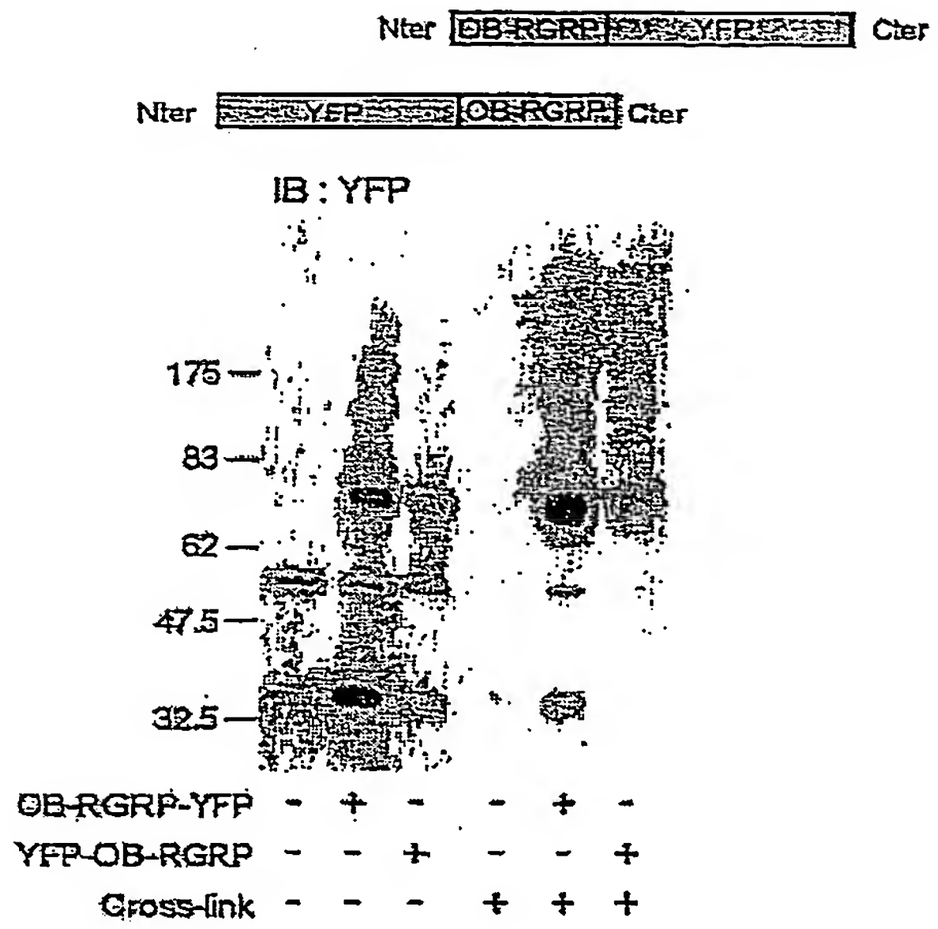


Figure 4 A

Figure 4B



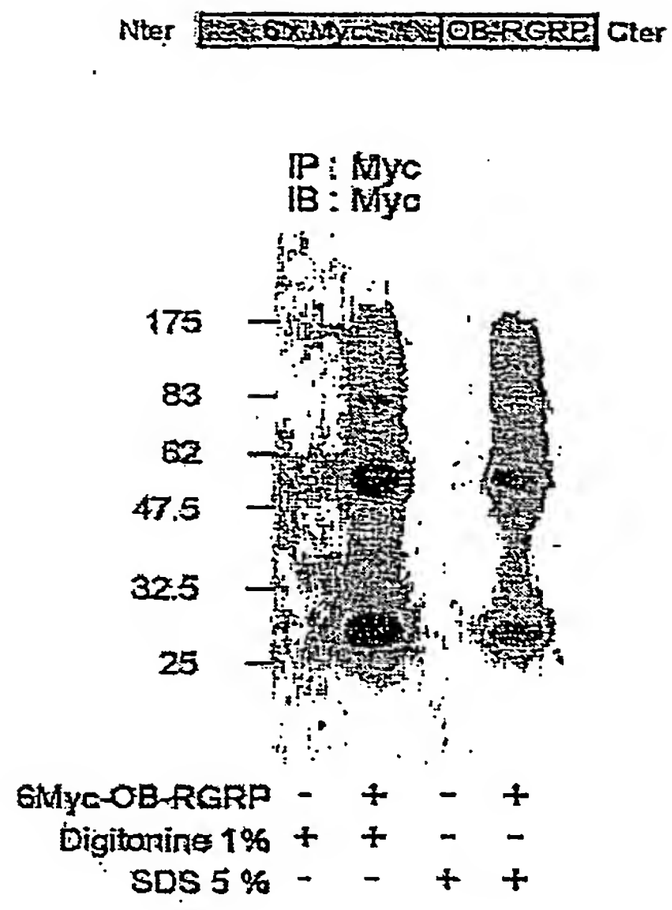


Figure 5

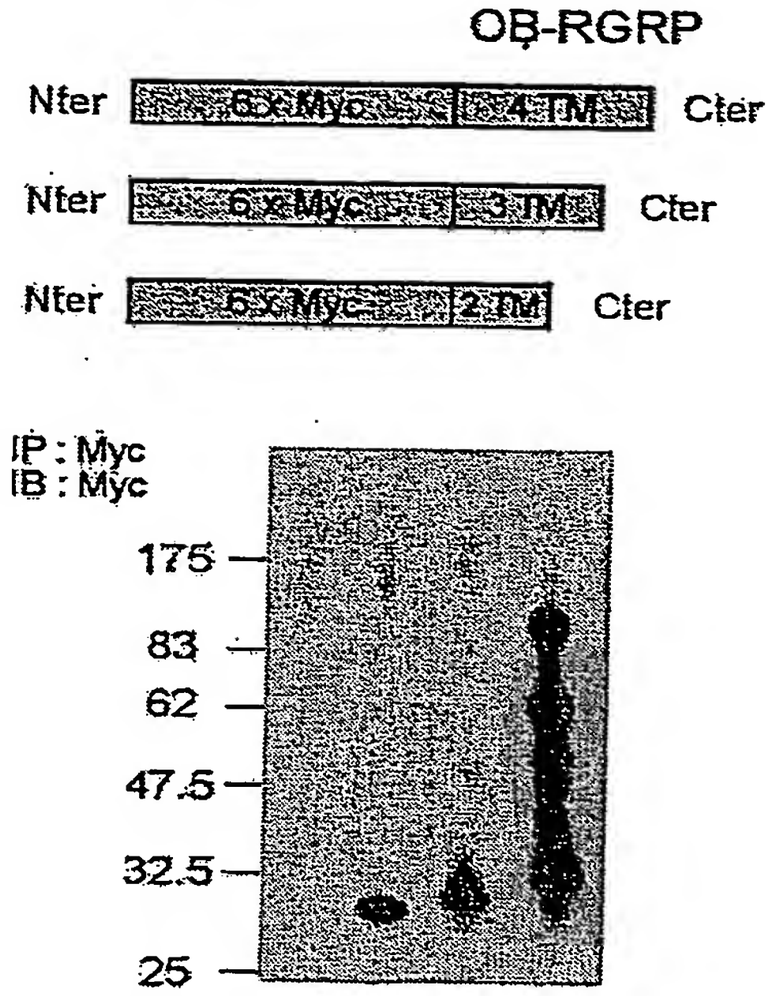

OB-RGRP
Nter
6 x Myc
4 TM
Cter
Nter
6 x Myc
3 TM
Cter
Nter
6 x Myc
2 TM
Cter
IP : Myc
IB : Myc
175
83
62
47.5
32.5
25
6Myc-OB-RGRP 2TM - + - -
6Myc-OB-RGRP 3TM - - + -
6Myc-OB-RGRP 4TM - - - +

Figure 6 A

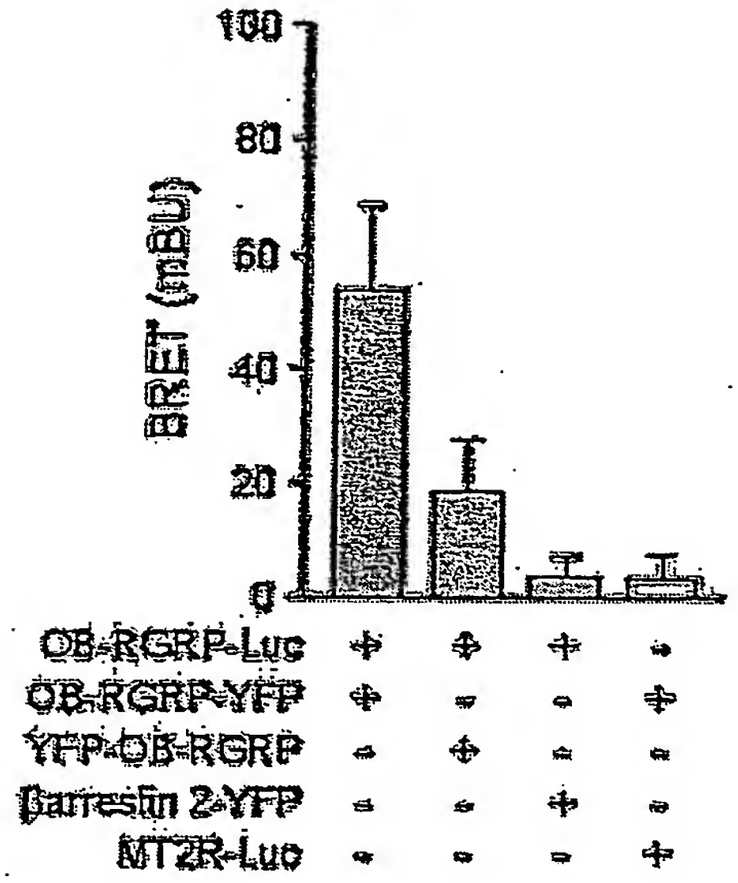


Figure 6B

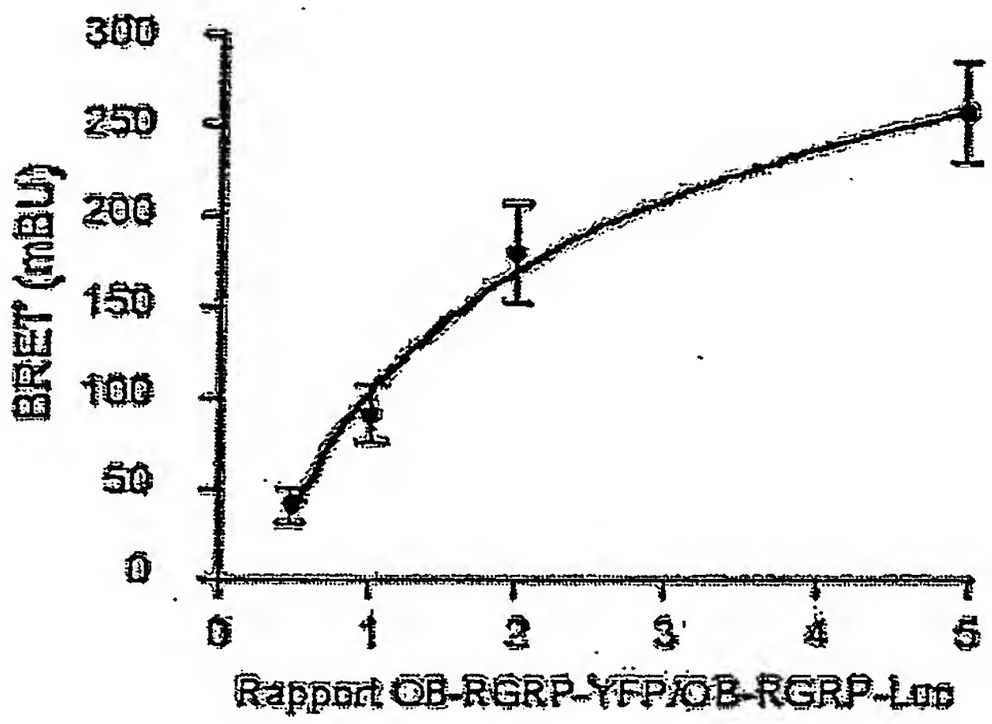
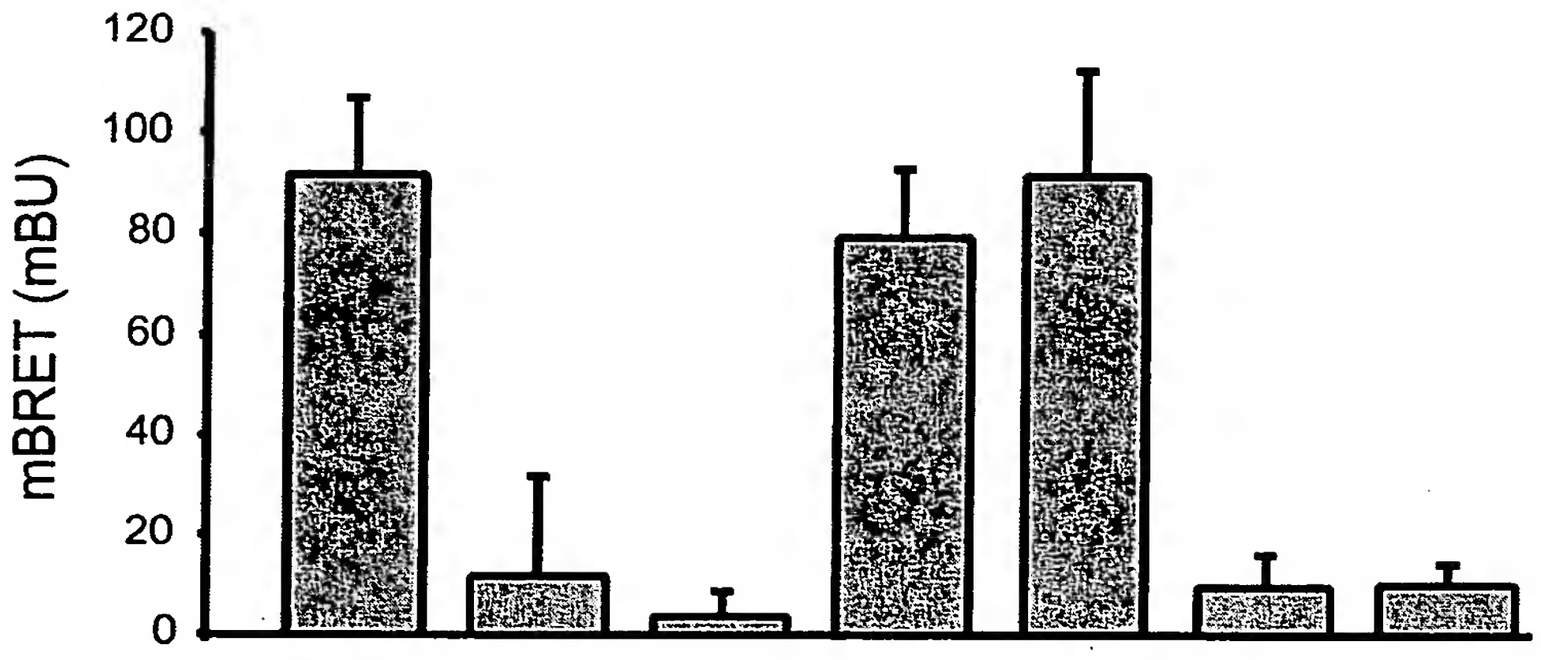


Figure 7



OB-Rs-Luc	+	+	+	+	-	-	-
OB-RGRP-YFP	+	-	-	-	-	+	-
YFP-OB-RGRP	-	+	-	-	-	-	-
MYO47-YFP	-	-	-	+	-	-	+
IR-YFP	-	-	+	-	-	-	-
OB-RI-Luc	-	-	-	-	+	+	+
OB-RI-YFP	-	-	-	-	+	-	-

Figure 8 a

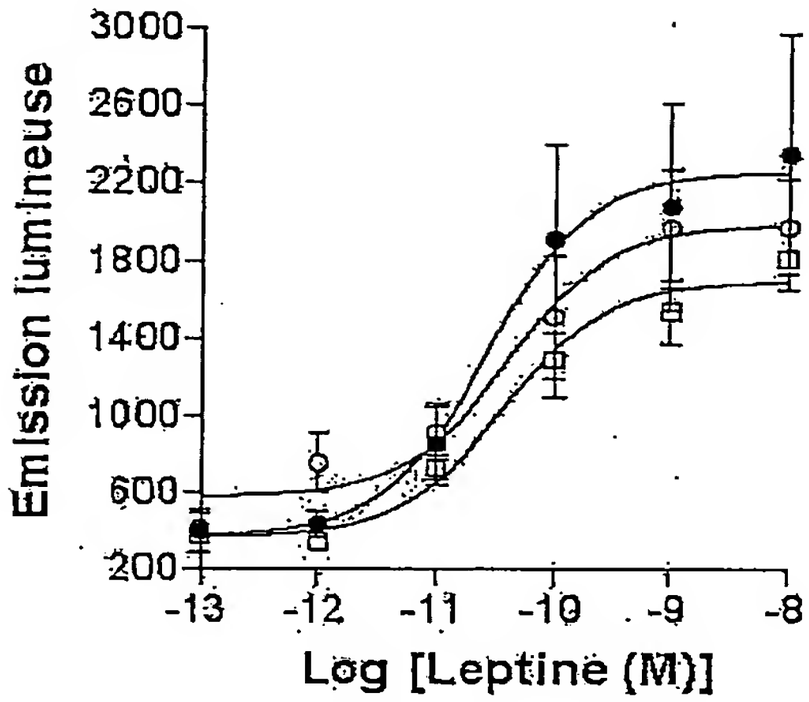


Figure 8b

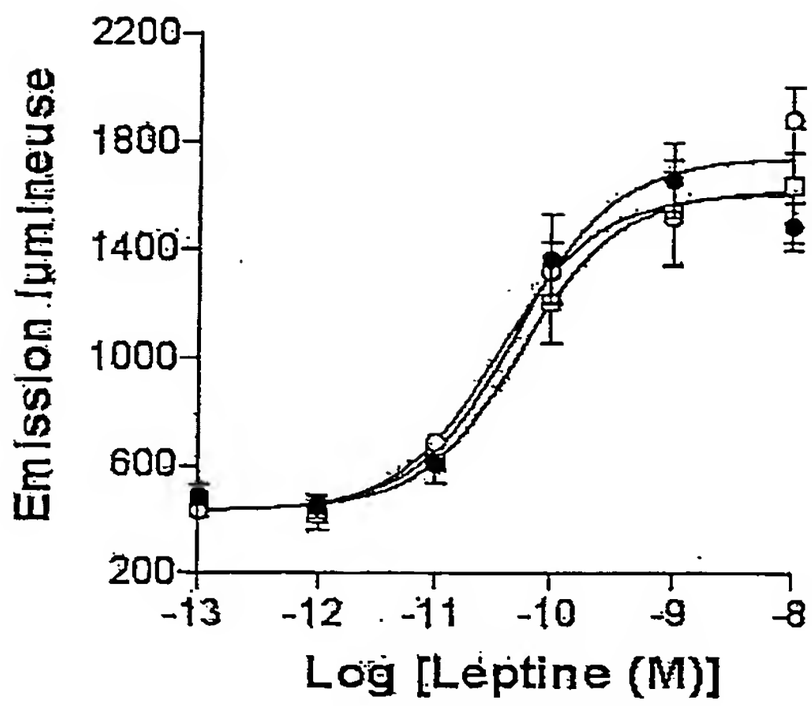


Figure 9

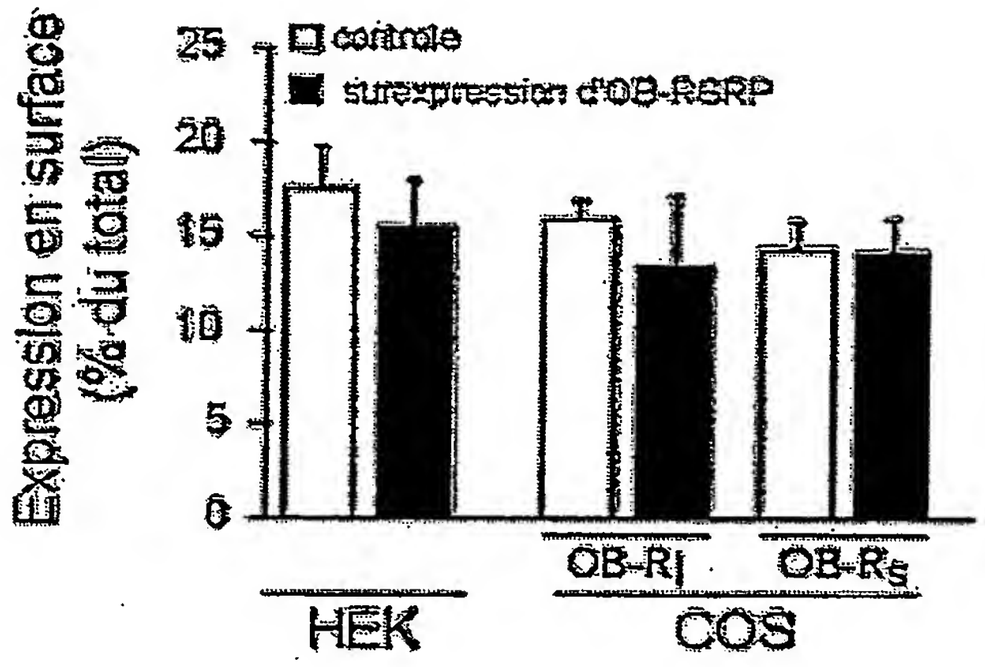

Expression en surface
(% du total)
25
20
15
10
5
0
controle
surexpression d'OB-RSRP
OB-Rl
OB-Rs
HEK
COS

Figure 10a

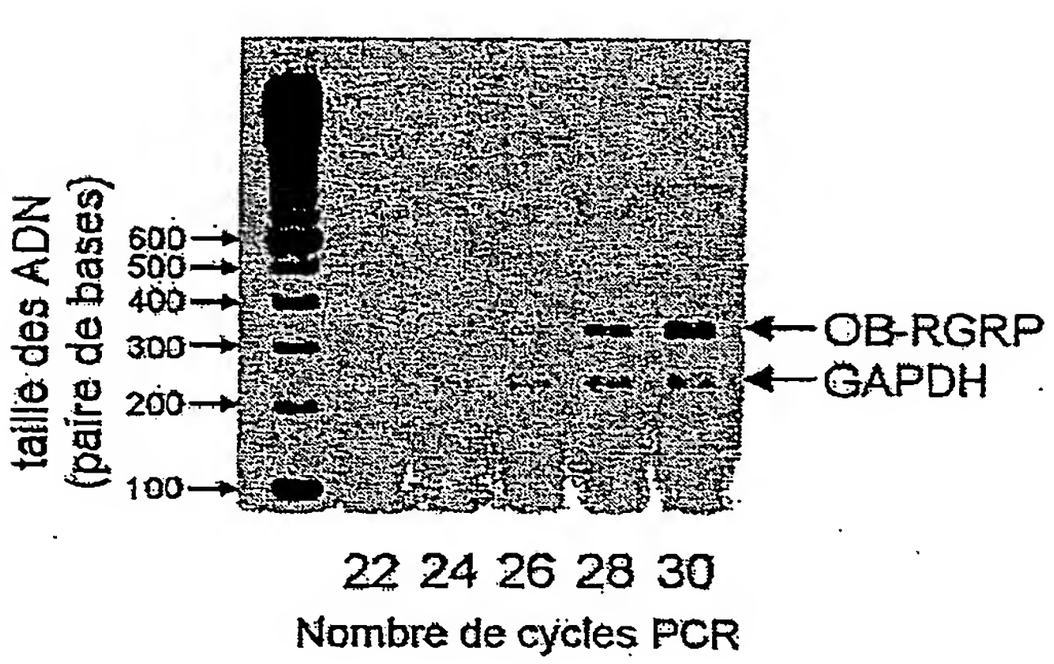
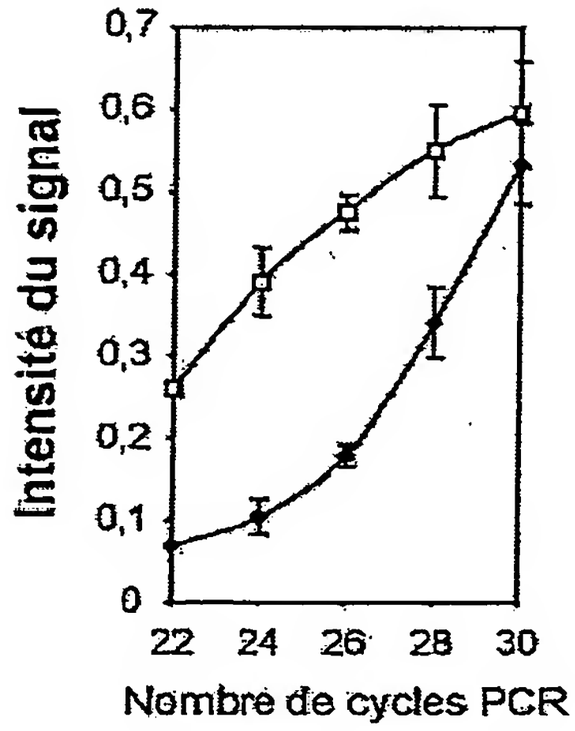


Figure 10b



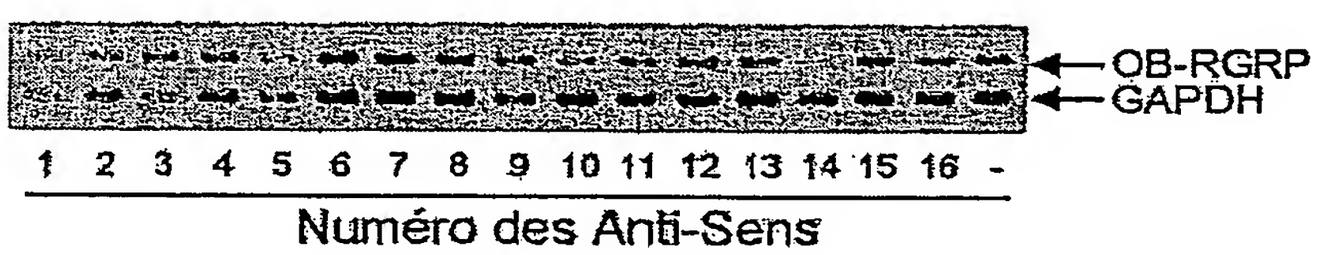


Figure 10c

FIGURE 11A

```
  5'- gugccugucgggaacuggcTT -3'
3'- TTcacggacagcccuugaccg -5'
```

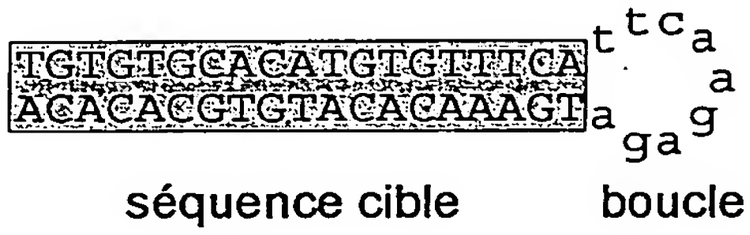
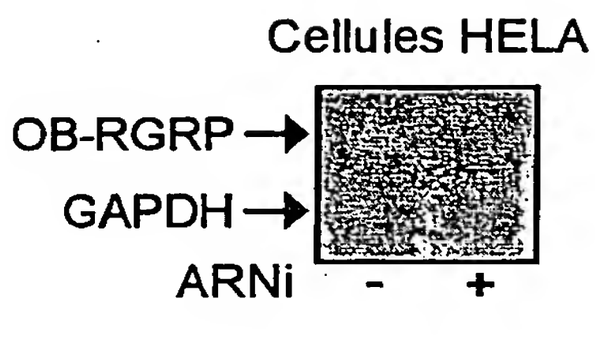


FIGURE 11C

FIGURE 11B



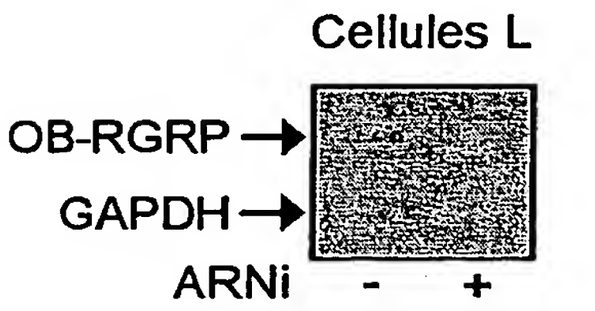


FIGURE 11D

FIGURE 12

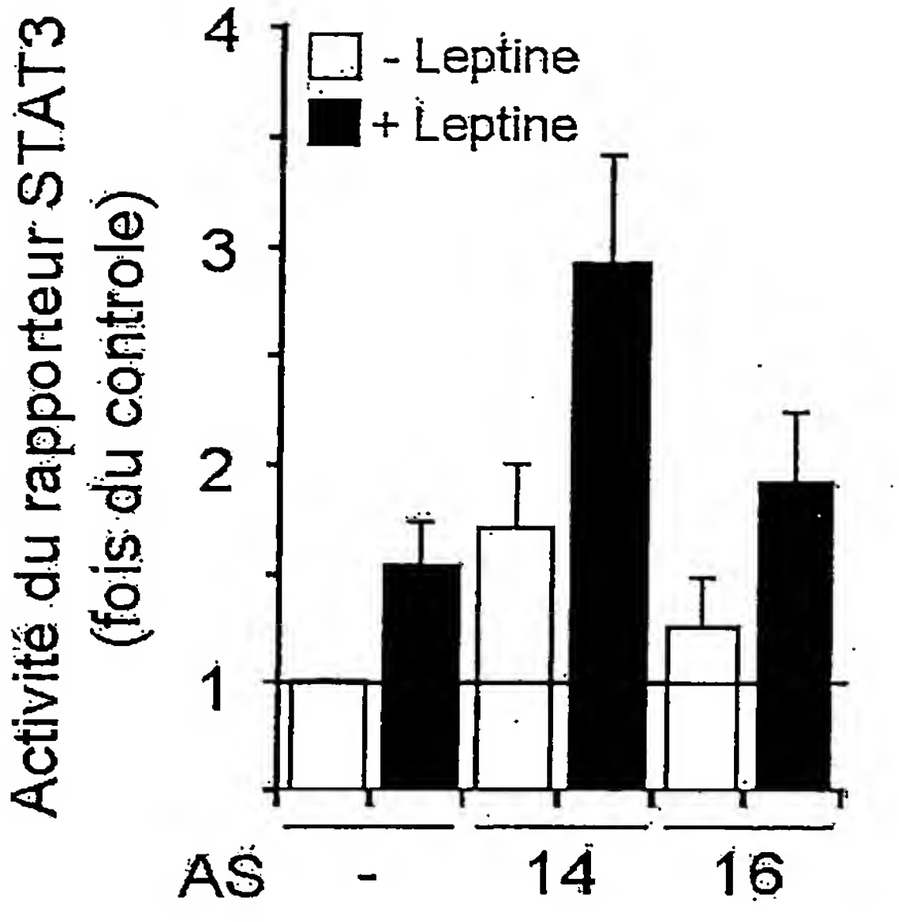
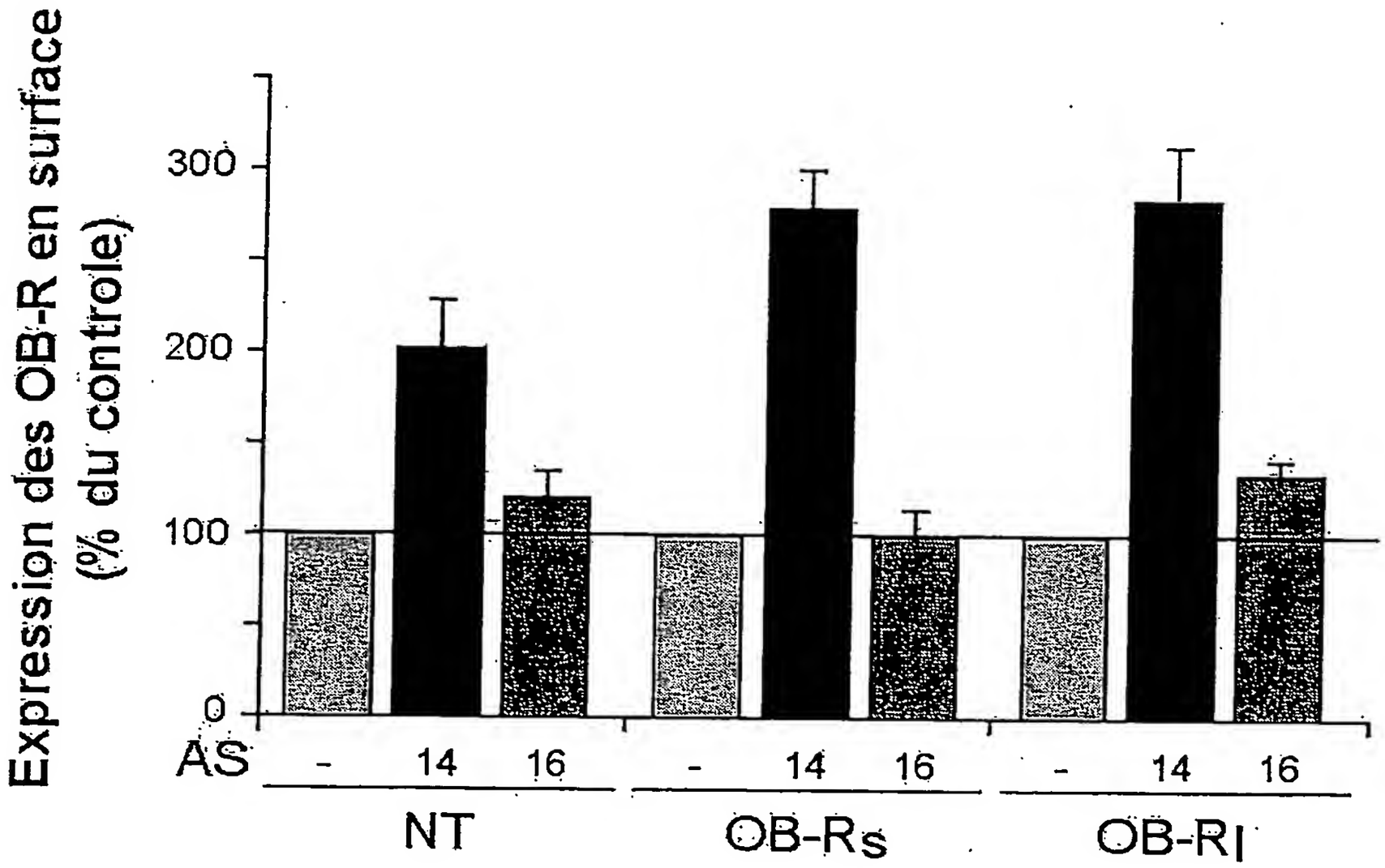

Activité du rapporteur STAT3
(fois du controle)
4
3
2
1
- Leptine
+ Leptine
AS
-
14
16

FIGURE 13


Expression des OB-R en surface
(% du controle)
300
200
100
0
AS
-
14
16
-
14
16
-
14
16
NT
OB-Rs
OB-Rl